

What is claimed is:

1. A substantially purified human signal peptide-containing protein (SIGP) comprising a polypeptide having an amino acid sequence selected from the group consisting of SEQ ID NO:1, SEQ ID NO:2, SEQ ID NO:3, SEQ ID NO:4, SEQ ID NO:5, SEQ ID NO:6, SEQ ID NO:7, SEQ ID NO:8, SEQ ID NO:9, SEQ ID NO:10, SEQ ID NO:11, SEQ ID NO:12, SEQ ID NO:13, SEQ ID NO:14, SEQ ID NO:15, SEQ ID NO:16, SEQ ID NO:17, SEQ ID NO:18, SEQ ID NO:19, SEQ ID NO:20, SEQ ID NO:21, SEQ ID NO:22, SEQ ID NO:23, SEQ ID NO:24, SEQ ID NO:25, SEQ ID NO:26, SEQ ID NO:27, SEQ ID NO:28, SEQ ID NO:29, SEQ ID NO:30, SEQ ID NO:31, SEQ ID NO:32, SEQ ID NO:33, SEQ ID NO:34, SEQ ID NO:35, SEQ ID NO:36, SEQ ID NO:37, SEQ ID NO:38, SEQ ID NO:39, SEQ ID NO:40, SEQ ID NO:41, SEQ ID NO:42, SEQ ID NO:43, SEQ ID NO:44, SEQ ID NO:45, SEQ ID NO:46, SEQ ID NO:47, SEQ ID NO:48, SEQ ID NO:49, SEQ ID NO:50, SEQ ID NO:51, SEQ ID NO:52, SEQ ID NO:53, SEQ ID NO:54, SEQ ID NO:55, SEQ ID NO:56, SEQ ID NO:57, SEQ ID NO:58, SEQ ID NO:59, SEQ ID NO:60, SEQ ID NO:61, SEQ ID NO:62, SEQ ID NO:63, SEQ ID NO:64, SEQ ID NO:65, SEQ ID NO:66, SEQ ID NO:67, SEQ ID NO:68, SEQ ID NO:69, SEQ ID NO:70, SEQ ID NO:71, SEQ ID NO:72, SEQ ID NO:73, SEQ ID NO:74, SEQ ID NO:75, SEQ ID NO:76, and SEQ ID NO:77.

2. An isolated and purified polynucleotide which hybridizes under stringent conditions to the polynucleotide encoding an SIGP of claim 1.

3. An isolated and purified polynucleotide encoding the SIGP of claim 1.

4. A microarray containing at least a fragment of at least one of the polynucleotides encoding an SIGP of claim 1.

5. An isolated and purified polynucleotide variant having at least 90% polynucleotide identity to the polynucleotide of claim 3.

6. A composition comprising the polynucleotide of claim 3.

7. An isolated and purified polynucleotide which hybridizes under stringent conditions to the polynucleotide of claim 3.

8. An isolated and purified polynucleotide which is complementary to the polynucleotide of claim 3.

9. An isolated and purified polynucleotide having a nucleic acid sequence

selected from the group consisting of SEQ ID NO:76, SEQ ID NO:77, SEQ ID NO:78, SEQ ID NO:79, SEQ ID NO:80, SEQ ID NO:81, SEQ ID NO:82, SEQ ID NO:83, SEQ ID NO:84, SEQ ID NO:85, SEQ ID NO:86, SEQ ID NO:87, SEQ ID NO:88, SEQ ID NO:89, SEQ ID NO:90, SEQ ID NO:91, SEQ ID NO:92, SEQ ID NO:93, SEQ ID NO:94, SEQ ID NO:95, SEQ ID NO:96, SEQ ID NO:97, SEQ ID NO:98, SEQ ID NO:99, SEQ ID NO:100, SEQ ID NO:101, SEQ ID NO:102, SEQ ID NO:103, SEQ ID NO:104, SEQ ID NO:105, SEQ ID NO:106, SEQ ID NO:107, SEQ ID NO:108, SEQ ID NO:109, SEQ ID NO:110, SEQ ID NO:111, SEQ ID NO:112, SEQ ID NO:113, SEQ ID NO:114, SEQ ID NO:115, SEQ ID NO:116, SEQ ID NO:117, SEQ ID NO:118, SEQ ID NO:119, SEQ ID NO:120, SEQ ID NO:121, SEQ ID NO:122, SEQ ID NO:123, SEQ ID NO:124, SEQ ID NO:125, SEQ ID NO:126, SEQ ID NO:127, SEQ ID NO:128, SEQ ID NO:129, SEQ ID NO:130, SEQ ID NO:131, SEQ ID NO:132, SEQ ID NO:133, SEQ ID NO:134, SEQ ID NO:135, SEQ ID NO:136, SEQ ID NO:137, SEQ ID NO:138, SEQ ID NO:139, SEQ ID NO:140, SEQ ID NO:141, SEQ ID NO:142, SEQ ID NO:143, SEQ ID NO:144, SEQ ID NO:145, SEQ ID NO:146, SEQ ID NO:147, SEQ ID NO:148, SEQ ID NO:149, SEQ ID NO:150, SEQ ID NO:151, SEQ ID NO:152, SEQ ID NO:153, and SEQ ID NO:154.

10. An isolated and purified polynucleotide variant having at least 90% polynucleotide identity to the polynucleotide of claim 9.

11. An isolated and purified polynucleotide which is complementary to the polynucleotide sequence of claim 9.

12. An expression vector containing at least a fragment of the polynucleotide of claim 3.

13. A host cell containing the expression vector of claim 12.

14. A method for producing a polypeptide encoding a human signal peptide-containing protein, the method comprising the steps of:

(a) culturing the host cell of claim 13 under conditions suitable for the expression of the polypeptide; and

(b) recovering the polypeptide from the host cell culture.

15. A pharmaceutical composition comprising the SIGP of claim 1 in conjunction with a suitable pharmaceutical carrier.

16. A purified antibody which specifically binds to the SIGP of claim 1.

17. A purified agonist of the SIGP of claim 1.

18. A purified antagonist of the SIGP of claim 1.

19. A method for treating or preventing a cancer, the method comprising

5 administering to a subject in need of such treatment an effective amount of the pharmaceutical composition of claim 15.

20. A method for treating or preventing a cancer, the method comprising administering to a subject in need of such treatment an effective amount of the antagonist of claim 18.

10 21. A method for treating or preventing an immune response, the method comprising administering to a subject in need of such treatment an effective amount of the antagonist of claim 18.

22. A method for detecting a polynucleotide encoding a human signal peptide-containing protein in a biological sample containing nucleic acids, the method comprising the steps of:

15 (a) hybridizing the polynucleotide of claim 8 to at least one of the nucleic acids of the biological sample, thereby forming a hybridization complex; and

(b) detecting the hybridization complex, wherein the presence of the hybridization complex correlates with the presence of a polynucleotide encoding SIGP in the biological sample.

20 23. The method of claim 22 wherein the nucleic acids of the biological sample are amplified by the polymerase chain reaction prior to the hybridizing step.